

Appl. No. : 09/764,680  
Filed : January 18, 2001

### AMENDMENTS TO THE SPECIFICATION

Please replace the paragraph starting on line 1 of page 4 with the following amended paragraph:

In an embodiment according to the present invention, the combining of the down-converted sample with the delayed version of the input reference signal substantially reduces the main signal component of the combined signal while substantially maintaining the error component of the down-converted sample, thereby allowing an analog-to-digital converter to more accurately capture the error component. The combined signal advantageously allows the analog-to-digital converter to capture the error components in smaller and more precise quantization steps and can enhance the adaptive updates to the predistortion and thereby enhance the improvement to linearity of the predistortion, or allow the cost effective use of a simpler and cheaper analog-to-digital converter with fewer bits. One embodiment further includes adaptively scaling an amplitude of the modified down-converted signal or combined signal in response to the error signal from the analog-to-digital converter to conform the amplitude of the modified down-converted signal to an input range of the analog-to-digital converter.